

PUBLIC AWARENESS

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CFR 192.616 Public Awareness

- (a) Except for an operator of a master meter or petroleum gas system covered under paragraph (j) of this section, each pipeline operator must develop and implement a written continuing public education program that follows the guidance provided in the American Petroleum Institute's (API) Recommended Practice (RP) 1162 (incorporated by reference, *see* § 192.7).

CFR 192.616 and API RP 1162

I know what the Code of Federal Regulation is, but what is API RP 1162?

- ▶ The American Petroleum Institute is the only national trade association representing all facets of the natural gas and oil industry
- ▶ More than 600 members include large integrated companies, exploration and production, refining, marketing, pipeline, and marine businesses, and service and supply firms
- ▶ API was formed in 1919 as a standards-setting organization. In its first 100 years, API has developed more than 700 standards to enhance operational and environmental safety, efficiency and sustainability.

API's Mission

- ▶ API's mission is to promote safety across the industry globally and to influence public policy in support of a strong, viable U.S. oil and natural gas industry.

CFR 192.616 and API RP 1162

I know what the Code of Federal Regulation is, but what is API RP 1162?

Advocacy

- ▶ Represents the oil and natural gas industry to the public, Congress and the Executive Branch, state governments and the media

Research & Statistics

- ▶ Conducts or sponsors research ranging from economic analyses to toxicological testing
- ▶ Collect, maintain and publish statistics and data on all aspects of U.S. industry operations, including supply and demand for various products, imports and exports, drilling activities and costs, and well completions

Standards

- ▶ Leads the development of petroleum, natural gas and petrochemical equipment and operating standards

Certification

- ▶ API Monogram Program verifies that manufacturers are operating in compliance with industry standards.

CFR 192.616 and API RP 1162

- ▶ The first edition of American Petroleum Institute's Recommended Practice 1162 (API RP 1162) entitled "Public Awareness Programs for Pipeline Operators" was created in December 2003. This document was incorporated by reference into the Code of Federal Regulation under 192.7.
- ▶ The second edition was published in 2010, however, this edition was not incorporated by reference.
- ▶ Currently, a third version is being drafted and hopefully completed in 2020.

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- (b) The operator's program must follow the general program recommendations of API RP 1162 and assess the unique attributes and characteristics of the operator's pipeline and facilities.

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- (c) The operator must follow the general program recommendations, including baseline and supplemental requirements of API RP 1162, unless the operator provides justification in its program or procedural manual as to why compliance with all or certain provisions of the recommended practice is not practicable and not necessary for safety.
- ▶ *Difficult to prove that Public Awareness is “not practicable”*
- ▶ *Difficult to prove that Public Awareness is “not necessary for safety”*

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- (d) The operator's program must specifically include provisions to educate the public, appropriate government organizations, and persons engaged in excavation related activities on:
- ▶ (1) Use of a one-call notification system prior to excavation and other damage prevention activities
 - ▶ (2) Possible hazards associated with unintended releases from a gas pipeline facility
 - ▶ (3) Physical indications that such a release may have occurred
 - ▶ (4) Steps that should be taken for public safety in the event of a gas pipeline release
 - ▶ (5) Procedures for reporting such an event

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- (e) The program must include activities to advise affected municipalities, school districts, businesses, and residents of pipeline facility locations.
- Know the requirements of 192.707

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- (f) The program and the media used must be as comprehensive as necessary to reach all areas in which the operator transports gas.

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- (g) The program must be conducted in English and in other languages commonly understood by a significant number and concentration of the non-English speaking population in the operator's area.

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- (h) Operators in existence on June 20, 2005, must have completed their written programs no later than June 20, 2006. The operator of a master meter or petroleum gas system covered under paragraph (j) of this section must complete development of its written procedure by June 13, 2008. Upon request, operators must submit their completed programs to PHMSA or, in the case of an intrastate pipeline facility operator, the appropriate State agency.

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- (i) The operator's program documentation and evaluation results must be available for periodic review by appropriate regulatory agencies.
 - ▶ See documentation as “taking credit” for everything you do as an operator to fulfill the CFR and RP 1162 requirements
 - ▶ FAQ #22: Operators may use external support resources or 3rd Party vendors to develop, implement, and or evaluate their PAP. If external support is used, the operator is still required to comply with Federal requirements and provide documentation, justifications and methodologies during inspections.

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Master Meter Operator Exemption

- (j) Unless the operator transports gas as a primary activity, the operator of a master meter or petroleum gas system is not required to develop a public awareness program as prescribed in paragraphs (a) through (g) of this section. Instead the operator must develop and implement a written procedure to provide its customers public awareness messages twice annually. If the master meter or petroleum gas system is located on property the operator does not control, the operator must provide similar messages twice annually to persons controlling the property. The public awareness message must include:
- ▶ (1) A description of the purpose and reliability of the pipeline;
 - ▶ (2) An overview of the hazards of the pipeline and prevention measures used;
 - ▶ (3) Information about damage prevention;
 - ▶ (4) How to recognize and respond to a leak; and
 - ▶ (5) How to get additional information.

American Petroleum Institute's Recommended Practice 1162

INTRODUCTION

The purpose of these guidelines is to reduce pipeline accidents, which are often attributable to digging by homeowners, contractors (third-party excavators), and farmers

- ▶ Provides guidance to be used by operators to develop and actively manage PAPs
- ▶ Help to improve the quality of pipeline operators' PAP, establish consistency among such programs throughout the pipeline industry
- ▶ Provide mechanisms for continuous improvement of the programs

Public Awareness Objectives

First Goal of API RP 1162:

Increase Public Awareness of Pipelines

- ▶ Raise awareness of pipelines in their communities
- ▶ Increase the understanding of the role of pipelines in transporting energy
- ▶ Reduce the likelihood and potential impact of pipeline emergencies and releases
- ▶ Help the public understand that while pipeline accidents are possible, pipelines are a relatively safe mode of transportation
- ▶ Communicate with emergency responders and public officials to provide awareness of the hazards associated with pipeline in preparation of the unlikely event of a release of product.
- ▶ A more informed public will also understand that they have a significant role in helping to prevent accidents that are caused by third-party damage and ROW encroachment

Public Awareness Objectives

Second Goal of API RP 1162:

Help the public understand their role to prevent and respond to pipeline emergencies

Prevention

- ▶ Reduce the occurrences of pipeline emergencies caused by third-party damage through awareness of safe excavation practices and the use of the One-Call System

Response

- ▶ Communicate to the public the appropriate steps to take in the event of a pipeline release or emergency

Prevention and Response (together with others that may be identified by individual pipeline operators) provide the foundation on which a pipeline Public Awareness Program is built. Two important objectives of this RP include:

- ▶ Assist each pipeline operator to develop a framework for managing its Public Awareness Program so that the quality of Public Awareness Programs can be continually improved throughout the pipeline industry
- ▶ Provide the operator with considerations to determine how to enhance its program to provide the appropriate level of public awareness outreach for a given area and certain circumstances

American Petroleum Institute's Recommended Practice 1162

API RP 1162 is divided into 8 sections:

1. Introduction, Scope and Glossary of Terms
2. Public Awareness Program Development
3. Stakeholder Audiences
4. Message Content
5. Message Delivery Methods and/or Media
6. Recommendations for Supplemental Enhancements of Baseline PAPs
7. Program Documentation and Recordkeeping
8. Program Evaluation

* There are also 5 Appendices (A-E) that provide additional information, but are not enforceable.

Stakeholder Identification (section 3)

The primary audience for this RP is the pipeline operator for use in developing a Public Awareness Program for the following stakeholder audiences:

- ▶ **The affected public** (i.e., residents, and places of congregation (businesses, schools, etc.) along the pipeline and the associated right-of-way (ROW))
- ▶ **Local and state emergency response** and planning agencies (i.e., State and County Emergency Management Agencies (EMA) and Local Emergency Planning Committees)
- ▶ **Local public officials** and governing councils
- ▶ **Excavators**

Message Content (section 4)

An operator should select the optimum combination of message, delivery method, and frequency that meets the needs of the intended audience.

- ▶ Pipeline Purpose and Reliability
- ▶ Hazard Awareness and Prevention Measures
- ▶ Leak Recognition and Response
 - ▶ Potential Hazards of Products Transported
 - ▶ How to Recognize a Pipeline Leak
 - ▶ Response to a Pipeline Leak
 - ▶ Liaison with Emergency Officials

Message Content (section 4)

An operator should select the optimum combination of message, delivery method, and frequency that meets the needs of the intended audience.

- ▶ Emergency Preparedness Communications (192.615 Emergency Plans)
 - ▶ Priority to Protect Life
 - ▶ Emergency Contacts
 - ▶ Emergency Preparedness Response Plans
 - ▶ Emergency Preparedness - Drills and Exercises
- ▶ Damage Prevention (192.614 Damage Prevention)

Message Delivery Methods and/or Media

(section 5)

The content of the communication efforts should be tailored to:

- ▶ Needs of the audience
- ▶ Type of pipeline and/or facilities
- ▶ Intent of the communication, and
- ▶ Appropriate method/media for the content

Message Delivery Methods and/or Media

(section 5)

Types of Communication:

Targeted Distribution of Print Materials

- ▶ Brochures, Flyers, Pamphlets and Leaflets
- ▶ Letters
- ▶ Pipeline Maps
- ▶ Response Cards
- ▶ Bill Stuffers

Personal Contact

- ▶ Door-to-door contact
- ▶ Telephone calls
- ▶ Group meetings
- ▶ Open Houses
- ▶ Community Events

Message Delivery Methods and/or Media

(section 5)

Types of Communication:

Electronic Communication Methods

- ▶ Videos and CDs
- ▶ E-mail

Mass Media Communications

- ▶ Public Service Announcements
- ▶ Newspapers and Magazines
- ▶ Paid Advertising
- ▶ Community and Neighborhood Newsletters

Message Delivery Methods and/or Media

(section 5)

Types of Communication:

Specialty Advertising Materials

Informational or Educational Items

Pipeline Marker Signs

One-Call Center Outreach

Operator Websites

Message Delivery Frequency (section 2)

Stakeholder Audience	Message Type	Suggested Frequency	Suggested Delivery Method and/or Media
2-2.1 Affected Public			
Residents along the Local Distribution System (LDC)	Baseline Messages: <ul style="list-style-type: none"> • Pipeline purpose and reliability • Awareness of hazards and prevention measures undertaken • Damage prevention awareness • Leak recognition and response • How to get additional information 	Baseline Frequency = Annual	Baseline Activity: <ul style="list-style-type: none"> • Public service announcements, OR • Paid advertising, OR • Bill stuffers (for combination electric & gas companies)
		Supplemental Frequency: <ul style="list-style-type: none"> • Additional frequency and supplemental efforts as determined by specifics of the pipeline segment or environment 	Supplemental Activity: <ul style="list-style-type: none"> • Targeted distribution of print materials • Newspaper and magazines • Community events or • Community neighborhood newsletters
LDC Customers	Baseline Messages: <ul style="list-style-type: none"> • Pipeline purpose and reliability • Awareness of hazards and prevention measures undertaken • Damage Prevention Awareness • Leak Recognition and Response • How to get additional information 	Baseline Frequency = Twice annually	Baseline Activity: <ul style="list-style-type: none"> • Bill stuffers
		Supplemental Frequency: <ul style="list-style-type: none"> • Additional frequency and supplemental efforts as determined by specifics of the pipeline segment or environment 	Supplemental Activity: <ul style="list-style-type: none"> • Targeted distribution of print materials

Message Delivery Frequency (section 2)

2-2.2 Emergency Officials			
Emergency Officials	Baseline Messages: <ul style="list-style-type: none">• Pipeline purpose and reliability• Awareness of hazards and prevention measures undertaken• Emergency preparedness communications• How to get additional information	Baseline Frequency = Annual	Baseline Activity: <ul style="list-style-type: none">• Print materials, OR• Group meetings
		Supplemental Frequency: <ul style="list-style-type: none">• Additional frequency and supplemental efforts as determined by specifics of the pipeline segment or environment	Supplemental Activity: <ul style="list-style-type: none">• Telephone calls• Personal contact• Videos and CDs
2-2.3 Local Public Officials			
Public Officials	Baseline Messages: <ul style="list-style-type: none">• Pipeline purpose and reliability• Awareness of hazards and prevention measures undertaken• Emergency preparedness communications• How to get additional information	Baseline Frequency = 3 years	Baseline Activity: <ul style="list-style-type: none">• Targeted distribution of print materials
		Supplemental Frequency: <ul style="list-style-type: none">• Additional frequency and supplemental efforts as determined by specifics of the pipeline segment or environment	Supplemental Activity: <ul style="list-style-type: none">• Group meetings• Telephone calls• Personal contact

Message Delivery Frequency (section 2)

Stakeholder Audience	Message Type	Suggested Frequency	Suggested Delivery Method and/or Media
2-2.4 Excavators			
Excavators / Contractors	Baseline Messages: <ul style="list-style-type: none"> • Pipeline purpose and reliability • Awareness of hazards and prevention measures undertaken • Leak recognition and response • One-call requirements • How to get additional information 	Baseline Frequency = Annual	Baseline Activity: <ul style="list-style-type: none"> • One-Call Center outreach OR • Group meetings
		Supplemental Frequency: <ul style="list-style-type: none"> • Additional frequency and supplemental efforts as determined by specifics of the pipeline segment or environment 	Supplemental Activity: <ul style="list-style-type: none"> • Personal contact • Videos and CDs • Open houses
One-Call Centers	Baseline Messages: <ul style="list-style-type: none"> • Pipeline location information • Other requirements of the applicable One-Call Center 	Baseline Frequency: <ul style="list-style-type: none"> • Requirements of the applicable One-Call Center 	Baseline Activity: <ul style="list-style-type: none"> • Membership in appropriate One-Call Center • Requirements of the applicable One-Call Center • Maps (as required)
	Supplemental Messages: <ul style="list-style-type: none"> • One-Call System performance • Accurate line location information • One-Call System improvements 	Supplemental Frequency: <ul style="list-style-type: none"> • As changes in pipeline routes or contact information occur or as required by state requirements 	Supplement Activity: <ul style="list-style-type: none"> • Targeted distribution of print materials • Personal contact • Telephone calls • Maps (as required)

Recommendations for Supplemental Enhancements of Baseline Public Awareness Program (section 6)

The message content, the delivery medium, delivery frequency, and audience's retention of the delivered message should be carefully considered during the development and implementation of the operator's Public Awareness Program to achieve maximum effectiveness.

Consideration for Supplemental Enhancements for the Baseline Program

- ▶ Increased Frequency
- ▶ Enhanced Message Content and Delivery/Media Efforts
- ▶ Coverage Areas

Recommendations for Supplemental Enhancements of Baseline Public Awareness Program (section 6)

The message content, the delivery medium, delivery frequency, and audience's retention of the delivered message should be carefully considered during the development and implementation of the operator's Public Awareness Program to achieve maximum effectiveness.

Consideration of Relevant Factors

- ▶ Potential Hazards
- ▶ High Consequence Areas
- ▶ Population Density
- ▶ Land Development Activity
- ▶ Farming Activity
- ▶ Third-party Damage Incidents
- ▶ Environmental Considerations
- ▶ Pipeline History in an Area
- ▶ Results from previous Public Awareness Program Evaluations
- ▶ Other Relevant Needs

Recommendations for Supplemental Enhancements of Baseline Public Awareness Program (section 6)

Transmission Pipeline/Local Distribution Operators

- ▶ Affected Public
 - ▶ Farmers during plowing season
 - ▶ New housing development not reached previously
 - ▶ Increasing communication efforts
 - ▶ Frequently changing population
 - ▶ Right of way encroachments occurring more frequently
- ▶ Public Officials
 - ▶ Heightened public sensitivity to pipeline emergencies
 - ▶ New development in the area
- ▶ Emergency Officials
 - ▶ Heightened sensitivity to pipeline emergencies
 - ▶ After situations where response to a pipeline emergency could have been improved
- ▶ Excavator/Contractors and One-Call Centers
 - ▶ Elevated potential for third-party damage
 - ▶ Increased excavation activity near a pipeline route
 - ▶ Trending decline in the use of the one-call system.

Program Documentation and Recordkeeping (section 7)

Program Documentation

- ▶ Statement of management support
- ▶ Description of roles and responsibilities of personnel administering the program
- ▶ Identification of key personnel
- ▶ The media and methods of communication to be used, and the basis for selecting the chosen media/methods
- ▶ Documentation of the frequency of communication with each stakeholder audience
- ▶ Identification of any program enhancements beyond the baseline program
- ▶ Program evaluation process and methodology to be used

Program Recordkeeping

- ▶ Lists, records or other documentation of stakeholder audiences
- ▶ Copies of all materials provided to each stakeholder audience
- ▶ All program evaluations, including results, follow-up actions and expected results

Program Record Retention

- ▶ Records pertaining to Public Awareness should be retained for a MINIMUM of 5 years, or as defined in the operator's PAP (whichever is longer)

Program Evaluation (section 8)

Purpose and Scope of Evaluation

- ▶ Statement of management support
- ▶ Description of roles and responsibilities of personnel administering the program
- ▶ Identification of key personnel

Elements of Evaluation Plan

- ▶ Lists, records or other documentation of stakeholder audiences
- ▶ Copies of all materials provided to each stakeholder audience
- ▶ All program evaluations, including results, follow-up actions and expected results

Measuring Program Implementation

Program Evaluation (section 8)

Measuring Program Effectiveness

- ▶ Measure 1 - Outreach: Percentage of Each Intended Audience Reached with Desired Messages
- ▶ Measure 2 - Understandability of the Content of the Message
- ▶ Measure 3 - Desired Behavior by the Intended Stakeholder Audience
- ▶ Measure 4 - Achieving Bottom-Line Results

Program Evaluation (section 8)

The results of the evaluation need to be considered and revisions/updates made in the public awareness program plan, implementation, materials, frequency and/or messages accordingly.

Evaluation Approaches	Evaluation Techniques	Recommended Frequency
Self Assessment of Implementation	Internal review, <i>or</i> third-party assessment <i>or</i> regulatory inspection	Annually
Pre-Test Effectiveness of Materials	Focus groups (in-house or external participants)	Upon design or major redesign of public awareness materials or messages
Evaluation of effectiveness of program implementation: <ul style="list-style-type: none">• Outreach• Level of knowledge• Changes in behavior• Bottom-line results	<ol style="list-style-type: none">1. Survey: Can assess outreach efforts, audience knowledge and changes in behavior<ul style="list-style-type: none">• Operator-designed and conducted survey, or• Use of pre-designed survey by third-party or industry association, or• Trade association conducted survey segmented by operator, state or other relevant separation to allow application of results to each operator.2. Assess notifications and incidents to determine anecdotal changes in behavior.3. Documented records and industry comparisons of incidents to evaluate bottom-line results.	No more than four years apart. Operator should consider more frequent as a supplement or upon major redesign of program.
Implement changes to the Public Awareness Program as assessment methods above suggest.	Responsible person as designated in written Public Awareness Program	As required by findings of evaluations.

Is the need for Public Awareness increasing or decreasing?





Is the Public Awareness Plan Effective?



In Summary

EVERYONE PLAYS A ROLE IN PIPELINE SAFETY!

- ▶ Operating personnel
- ▶ Agencies that oversee the natural gas pipelines
- ▶ General public
- ▶ Public and emergency officials
- ▶ Excavators
- ▶ People living near the pipelines

While serious accidents are rare, it is the responsibility of the pipeline operator to continue to inform and engage with the public to ensure their awareness of pipelines in their communities. Awareness of the pipelines by the public is a large part of helping to reduce the risk and the reduction in risk is ultimately the end goal of your public awareness program.

Thank You!

